MARINE FACILITIES BEST MANAGEMENT PRACTICES

MARINE FACILITIES ARE REQUIRED TO OBTAIN AN ANNUAL OPERATING PERMIT FROM THE DEPARTMENT OF ENVIRONMENTAL RESOURCES MANAGEMENT, PURSUANT TO ORDINANCE 89-104.

Ordinance 89-104, which became effective on November 17, 1989, requires that the following marine facilities obtain annual operating permits from DERM:

1. All recreational boat docking facilities with ten or more boat slips;

2. All boat storage facilities with ten or more storage spaces;

3. All commercial boat docking facilities including the Port of Miami and shipping terminals on the Miami River.

The definition of these facilities are those definitions included in Ordinance 89-104 and incorporated herein by reference. Facilities which meet these definitions shall be required to obtain this permit. This permit shall not be required of those facilities which do not meet these definitions.

The Ordinance provides for specific operating permit conditions to be included as part of each annual permit to safeguard against pollution. It was agreed upon at the time of the public hearing on the Ordinance that these annual operating conditions would include:

1. Conditions that were previously part of a Coastal Construction Permit for a particular facility;

2. Standards which are already in Chapter 24 of the Metropolitan Dade County Code, with specific clarifications and interpretations where applicable to this marine facility operating permit;

3. Best Management Practices for the operation of the permitted facility.

Section 3 of the Ordinance established an Advisory Committee to make recommendations to DERM regarding conditions (the "Best Management Practices") which will be part of the operating permits for specific facilities. These conditions and practices were developed jointly by DERM and the Committee. Specific activities were identified (e.g. fueling, boat washing, engine repairs, sanding and painting) and these were discussed on the basis of the combined experience of members of the Committee, the existing standards of Chapter 24, and the experience of DERM'S Field Inspectors.

The Best Management Practices ("BMPs") which follow are the result. Some or all of these practices will apply to each permitted facility, depending on that facility's operations.

It is recognized that these BMPs cannot cover all possible situations, and that experience and new technologies may result in better solutions to pollution producing activities. It is understood that these

BMPs may be revised, discontinued or supplemented.

In the future, if the Committee and DERM agree on a change or addition to the BMPs, then that change shall become part of the BMPs. If a change is proposed by either the Committee or DERM, and there is not an agreement as to that change, then it shall be resolved as follows:

1. DERM shall have the option of excluding that change from the BMPs.

2. The Committee shall have the option of developing an alternative practice that accomplishes the objectives of Chapter 24 and is thereby acceptable to DERM. This alternative practice may then become part of the BMPs.

3. In the event that neither of the above resolutions are possible, DERM may codify a specific Best Management Practice by proposing an ordinance which requires the approval of the Metro Commission.

In addition, a permittee may propose an alternative methodology for a BMP which has been required for their particular facility. DERM shall review this alternative methodology and present it, with an evaluation, to the Committee. DERM and the Committee shall then either approve or disapprove the alternative methodology, as described above. If approved, this alternative methodology shall become an additional BMP. If disapproved, then the permittee shall conform to the BMP originally included in the operating permit. Any permittee shall have the right to appeal any BMP required as an operating permit condition to the Environmental Quality Control Board, pursuant to the provisions of Chapter 24 of the Dade County Code.

The purpose of the BMPs is to describe and promote "good housekeeping" practices that will enable marinas and marine facilities to materially reduce pollution generated by their activities. A permittee who operates in complete compliance with the BMPs attached hereto will be in compliance, for enforcement purposes, with Ordinance 89-104, and with Chapter 24, as it pertains to those specific activities described in the BMPs. However, any discharge from treatment processes specified in the BMPs must meet the applicable standards within Chapter 24. Furthermore, activities not described in the BMPs may be regulated and enforced by other ordinances and Chapter 24.

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BEST MANAGEMENT PRACTICES

Code # Activity or Product

001. Manatee Protection: Permittees should be aware that a "Dade County Manatee Protection Plan" has been developed and adopted. This plan provides insight into this endangered species' plight as well as its migratory travel paths and congregation areas. As such, this plan offers

valuable information for all marine facilities. This plan also sets forth new requirements for the operation of marine facilities to lessen the impacts of these new facilities on the manatee. These new requirements cover such items as the required retrofitting of berthing facilities that handle boats of 100 feet and larger, and the need for facilities to demonstrate that they meet certain new criteria before being permitted for expansion.

As the manatee's existence will be a key factor in how marine facilities will be allowed to operate in the future, it is recommended that each permittee familiarize themselves with the plan. Copies of this plan, DERM Technical Report 95-5, can be obtained by contacting Ms. Keven Mayo of DERM at 372-6789.

All permitted facilities shall post a minimum of two (2) "Manatee Caution" signs within their facility. Said signs shall be visible to vessels as they enter and exit the facility. In addition, all facilities shall provide vessel owners written manatee information every November. Smaller MOP sources located within larger marine facilities need not provide their own additional signage.

002. Hurricane Preparedness Plan: All permitted facilities shall prepare a written hurricane preparedness plan for their facility and provide a copy to all vessel owners using the permitted facility every June.

003. Pumpout Facility: Any facility required by law or a construction permit to have a fixed or portable pumpout facility shall maintain the pumpout in operating condition and shall have appropriate signage.

004. Discharge of Sewage from Vessels (excludes "Graywater", see BMP #016): Marine facility operators shall advise all tenants of the following:

A. It is illegal to discharge sewage from vessels into the waters of Dade County; and

B. Illegal discharge of sewage from vessels is subject to stiff fines; and

C. The location of the nearest public sewage pumpout facility.

005. Waste Oil: This includes waste engine oil, transmission fluid, hydraulic oil, gear oil. Waste oil must be stored in a non-leaking container clearly marked "waste oil" on an impervious surface, and covered in a manner that will prevent rain water from entering the container. Oil spills must be prevented from leaving the area by means of a berm or retaining structure. Waste oil must be removed from the site by a permitted waste oil transporter and receipts retained for inspection.

006. New Oil: This includes new engine oil, transmission fluid, hydraulic oil, gear oil. These petroleum products must be kept in non-leaking containers on an impervious surface with a surrounding berm or retaining structure, and covered in a manner that will prevent rain water from entering the container. Leaking containers must be emptied promptly upon detection, either by transferring the product to a non-leaking container or by disposing of it in the "waste oil" container.

007. Anti-Freeze Engine Coolant: Anti-freeze is considered a hazardous product and when drained from an engine, it must be stored in a clearly marked container on an impervious surface with a surrounding berm or retaining structure, and covered to prevent rain water from entering the container. It cannot be disposed of down a storm drain or sanitary sewer. It must be removed from the site by a permitted liquid waste transporter, and receipts must be retained for inspection.

008. Waste Gasoline: Must be stored in a non-leaking container, on an impervious surface with a surrounding berm or retaining structure, and covered to prevent rain water from entering the container. The container must be clearly labeled "waste gasoline" and the storage location must conform to local Fire Codes. Whenever possible, waste gasoline shall be filtered and used as a fuel. Waste gasoline shall not be discharged to the ground, storm sewers or to surface waters of Dade County. Waste gasoline must be removed from the site by a waste transporter permitted to handle this waste product and receipts must be retained for inspection.

009. Waste Diesel, Kerosene and Mineral Spirits: These must be stored in non-leaking containers on an impervious surface with a surrounding berm or retaining structure, and covered to prevent rain water from entering the container. Each container must be clearly labeled with its contents. The storage locations shall conform to local Fire Codes. The disposal of these waste products must be by a waste transporter permitted to handle such wastes, and receipts must be retained for inspection. Waste petroleum products shall not be discharged to the ground, storm sewers or to the surface waters of Dade County.

010. Oil Spills on Land: Oil spills shall be collected and put into the waste oil container. Oil residues may be absorbed with "spill-dry" or a similar product and disposed of with the regular trash.

011. Fuel Spills on Land:

A. Spilled diesel fuel shall be collected and placed in the waste diesel container. Uncollectible amounts may be absorbed using 'spill-dry" or other petroleum absorbent materials and disposed with the regular trash. If absorbent pads are used, they shall be double-bagged in plastic and disposed of with the regular trash. (This BMP pertains to spills of twenty five (25) gallons or less.)

B. Spilled gasoline shall be collected and placed in the waste gasoline container. Residues remaining on the ground may be absorbed with "spill-dry" or absorbent pads, but the absorbent material must be thoroughly aerated before disposing with the regular trash to remove gasoline vapors.

012. Grease: Spilled or waste grease shall be collected and put into the waste oil container. Residues remaining on the ground may be absorbed with "spill-dry" or a similar product and disposed of with the regular trash.

013. Oil Filters: These must be drained before disposal by placing the filter in a funnel over the waste oil collection container so as to allow the excess petroleum product to drain into the container. The drained filters must be stored, whole or crushed, in a DOT approved container and held for pick up by a permitted waste oil filter transporter and receipts must be retained for inspection.

Gasoline and diesel filters must also be drained (they can be drained into the waste oil container) and can then be disposed of in the same waste filter container. Facilities have the option to crush filters after draining in order to reduce waste volume, and to dispose of them as solid waste if a profile testing establishing that the residue remaining in the filters is non-hazardous.

014. Petroleum Products (general): Petroleum products shall not be discharged into a storm drain, sanitary sewer or onto the open ground or surface waters. Care must be taken in handling these products and spills cleaned up promptly at the time detected. All permitted facilities shall maintain a supply of petroleum absorbent material and "spill dry" in a readily accessible location. In addition, all marine facilities must have a written action plan to deal with large petroleum product spills. This plan must include, at a minimum, the names and telephone numbers of all agencies involved with fuel spills and a private cleanup contractor who can be contacted and hired in the event of a major spill.

015. Fueling Operations: Permittees with fueling operations should be aware of the Florida Statutes that pertain to their type of facility. These are Chapter 62-761 Underground Stationary Tank Rule and Chapter 62-762 Aboveground Stationary Tank Rule. Copies of these laws may be obtained from the Department of Environmental Protection, P.O. Box 15425, West Palm Beach, Florida 33416. In addition, this State agency also operates a pollution control program pertaining to the sale of diesel (not gasoline), and information on this program can be obtained from the same address. Chapter 24 of the Dade County Statutes includes information on DERM'S requirements regarding fueling facilities, record keeping, ground water testing, tank testing, pressure testing of lines, etc. Copies of these laws can be obtained from DERM at 372-6789. There have been significant changes in governmental requirements regarding many aspects of fueling operations, and it is in the best interest of any permittee dispensing fuel to be aware of these requirements and to anticipate any upgrades that may be required.

A. Individual Boats: Fuel nozzles must have automatic back pressure shutoffs and must not have a holding clip to keep the nozzle open (i.e., the nozzle shall only be held open by hand.) In the immediate vicinity of the dispenser, there must be petroleum absorbent pads readily accessible in the event of a small spill. A petroleum absorbent pad should be held next to the nozzle while filling, to catch small accidental spills and the few drops of fuel that fall from the nozzle when it is removed from the fill fitting. If fuel accidentally spills in the water or onto the ground, the person fueling the boat shall use the absorbent pads to remove the fuel from the water surface or from the ground. These absorbent pads shall be dried in the open air under sunlight and may then be disposed of with the regular trash.

B. Mobile Fueling Operations: Mobile fueling operations at any permitted facility shall be the joint responsibility of the permitted marine facility, the tank truck operator, and the vessel owner.

C. General: There shall be kept on hand a floating containment boom large enough to enclose the area of surface water where a fueling spill may reasonably occur, but with a minimum length of fifty feet. Petroleum absorbent materials shall also be kept available to absorb fuel spills on the surface water or on land. Reporting requirements for fuel

spills shall be followed as per Coast Guard and DERM regulations. All staff at fueling facilities shall have proper training in the deployment of fuel spill equipment and materials.

016. Bilge Waste Water: Bilge waste water and "gray" water that is not contaminated by oil, fuel or other regulated contaminants may be discharged onto surface waters or on land. Federal, state and local regulations prohibit the discharge of bilge waste water and "gray" water that is contaminated by oil, fuel or other regulated contaminants. Boat owners shall be liable for complying with these regulations and marine facilities shall inform them of this. Marine facilities shall have supplies and equipment available to remove oil and fuel from bilge water so that it may be legally discharged. These shall include petroleum absorbents and a written action plan to deal with larger quantities of oil, fuel or other regulated contaminants.

"Gray" water shall mean waste water from galley operations (dishwashing) and from hand basins and showers.

017. Used Lead-Acid Batteries: These must be stored on an impervious surface, under cover, and sent to or picked up by an approved recycler. Receipts must be retained for inspection.

018. Steam Cleaning: Must be done on an impervious area designed to collect and contain the cleaning effluent. The system may recycle, collect or treat the effluent:

A. If detergents or solvents are not used, a properly sized grease trap/oil and water separator connected to a sanitary sewer must provide adequate treatment to allow the effluent to meet sewer standards.

B. If detergents or solvents are used, the oil and grease are emulsified and a grease trap would no longer function properly. In these cases, treatment or recycling systems must be used. If the treated water meets sanitary sewer standards it may be discharged to sanitary sewers.

C. Any facility that has steam cleaning capabilities shall be required to have an IW-5 Permit from DERM in addition to the Marine Facility Permit, and will be classified as a multiple source.

019. Pressure Cleaning: The use of high or low pressure water cleaning equipment for the initial rinse-off of a vessel hauled from the water is acceptable. However, any accumulated algae, oyster or barnacle build-up must be properly collected and disposed of in the regular trash. The use of this equipment to remove bottom paint from hulls shall be restricted to an area with an impervious surface, where the waste water shall be contained, collected and treated to remove paint solids to meet the sanitary sewer standards. If standards are not met, further treatment will be required prior to discharging to the sanitary sewers.

020. Washing by Hand Above Waterline: Detergents and cleaning compounds used in washing boats shall be biodegradable. The waste water generated by washing boats by hand shall not be considered an "industrial waste" or "other waste" as defined in Chapter 24.

021. Automated Boat Washing Facilities (similar in concept to existing automated car washing facilities): Waste wash water generated by an automated boat washing facility shall be considered an "industrial waste water" as defined in Chapter 24, and DERM shall determine the requirements for permitting the construction of such a facility.

022. Bottom Paint Removal: Boat bottom paints contain metal compounds that are toxic to marine life and the removal of these paints from the bottom of a boat produces a waste product that is environmentally hazardous.

Paints containing tin compounds are regulated by the EPA and these paints may be applied or removed only by persons or organizations licensed by the EPA. The EPA regulations regarding storage, application, disposal of paint containers and paint residues, sanding dust, etc. are incorporated herein by reference.

Paint containing copper compounds shall be removed as follows:

A. Wet: Removing copper bottom paint by high pressure water or with a low pressure hose and a scrubber or scraper produces an "industrial waste water" as defined in Chapter 24. As a result, this activity must be conducted over an impervious surface (not over open ground) with a retaining berm so that the waste water can be contained. This waste water may be recycled or disposed of, but prior to disposal, it must be treated so as to reduce the levels of concentrations of heavy metals (principally copper) and meet the standards for disposal in sanitary sewers, as defined in Section 11(2) of Chapter 24. Paint solids may be collected and disposed of with the regular trash if placed in double plastic bags.

B. Dry: Removing copper bottom paint by dry sanding (either by hand or with power tools) produces a sanding dust containing potentially hazardous metals (principally copper). This sanding must be done over an impervious surface (not over open ground) and there must be a berm or retaining wall surrounding the area so that the sanding dust can be swept up or vacuumed up, double bagged in plastic, and disposed of with the regular trash.

023. Hand Sanding Hull or Topsides: There are no restrictions in regard to sanding without power tools, provided that reasonable efforts are taken to control sanding dust. The sanding generated may be swept up and disposed of with the regular trash. Hand sanding shall not be considered to generate a hazardous waste or an industrial waste.

024. Sanding Hull or Topsides with Power Tools: Permitted facilities shall set and enforce their own rules in regard to the use of power sanding tools. However, the sanding dust generated by this activity must be swept up and disposed of with the regular trash and may not be intentionally discharged into a storm drain or onto surface waters.

025. Engine and Parts Storage: Engines and engine parts must be stored on a covered, impervious

surface. Care must be taken to prevent oil and grease from leaking onto the open ground.

026. Engine Parts Washing: Parts washing may not be done over open ground. Parts washing must be done in a container or parts washer. The parts must be rinsed or air dried over the parts cleaning container. The dirty parts washing fluid must be recycled or disposed of by a licensed waste hauler. The preferred disposal method is by a permitted parts washing contractor who brings new fluid and takes away the sludge and dirty fluid.

027. Disposal of Solid Waste: All facilities shall provide an adequate number of leak proof containers for the disposal of solid waste and garbage.

028. U.S. Coast Guard MARPOL (Marine Pollution) Regulations: These regulations can be obtained by contacting the U.S. Coast Guard at 536-5693. Enforcement is by the Coast Guard, but DERM field inspectors are familiar with these regulations and will report violations to the Coast Guard.

A. The commercial dock or terminal operator, as the holder of a Marine Facility Permit, shall be responsible for the actions of any commercial vessel when it is at the permitted facility. This responsibility extends to foreign vessels, in Dade County waters, while docked at the permittees facility. It is the responsibility of the permit holder to be familiar with the MARPOL regulations as they apply to foreign vessels.

B. The permit holder shall provide adequate leak proof containers for the solid waste and garbage from a commercial vessel. Disposal of this waste must be in compliance with MARPOL and U.S.D.A. regulations.

C. Engine and hull repairs on a commercial vessel while at the permit holders facility must be in compliance with all applicable BMPs.

D. General: The operation of a commercial dock or terminal facility must be in compliance with all applicable BMPs. Activities on land or on the commercial vessel which are pollution producing, must be conducted in accord with these BMPs, in addition to the federal, state and local laws that apply.

E. MARPOL regulations prohibit the disposal or discharge of all solid waste into the waters of Dade County, from any marine facility and associated commercial or recreational vessels.

029. Spray Painting: Marine facilities that engage in spray painting are required to obtain a permit from DERM'S Air Section. This permit will be site specific, and will require a description of the equipment to be used and the type of work to be done. If a permanent spray booth is used then engineering plans or drawings will be required. Permits are issued to a facility and not to independent contractors. For information on obtaining this permit contact Ray Gordon or Ewart Anderson of DERM'S Air Section at 372-6925.

If spray painting is to be done outside of a spray booth, then "reasonable and adequate" measures

must be taken to contain the overspray. Measures such as impervious shields, screens or tarpaulins may control the overspray, however more stringent control measures may be required for site specific applications. Spray painting can only be done over an impervious surface such as asphalt, concrete or a tarpaulin, so that the paint does not contact the open ground. When spray painting is to be done on a vessel in the water, both floats and screens must be used so that overspray or other process materials do not enter the surface waters. If winds increase to the speed where overspray cannot be controlled, the spray painting must cease until the winds diminish.

A facility that does "touch-up spray painting" will be evaluated by the Air Section to determine if a permit is required. Paint touch-up with single aerosol cans will not require an air permit. The operation of "touch-up" spray painting is subject to the same "reasonable and adequate" requirements to control the overspray through the use of shields and drop cloths. It is the responsibility of the facility to have Material Safety Data sheets on the products being used in spray painting operations. This information will determine how the waste products generated by spray painting are to be disposed of. Waste solvents, catalysts and paint mixtures should be collected in DOT approved containers and may be recycled or disposed of by a permitted hazardous transporter.

Each facility is responsible for the actions of its employees and for the actions of independent contractors and it is the responsibility of the facility to inform such persons of the possible enforcement action and citations for violations of the regulations pertaining to spray painting.

030. Sandblasting: Marine facilities that perform sandblasting may require a permit from DERM'S Air Section. If required, this permit will be site specific, and will require engineering plans or drawings, a description of the equipment to be used and the type of work to be done. For information regarding this permit contact Ray Gordon or Ewart Anderson at DERM'S Air Section at 372-6925.

During sandblasting operations, the facility must provide "reasonable and adequate" measures to contain the waste generated by the sandblasting process. For example, sandblasting shall take place only over an impervious surface and not over open ground, and the waste generated shall not enter the surface waters. Screens, shields or tarpaulins shall be used to control the dust generated by sandblasting. Sandblasting shall not take place during periods of high winds when it is impossible to control the waste material.

Small amounts of sandblasting waste material (under 55 gallons) may be disposed with the regular trash. Larger quantities must be collected and disposed of in a Class I Landfill, Such as the Dade County Landfill or the Medley Landfill.

Sandblasting of tin-based paints generates a RCRA Hazardous Waste subject to strict EPA regulations, including regulations controlling the disposal of the waste material.

The sandblasting of steel hulls may generate a hazardous waste material. The facility can determine this by testing a composite profile sample. If the test establishes that the waste material is hazardous, then it must be disposed of as RCRA Hazardous Waste. If the material is non-hazardous, then it can be disposed of as described above, depending on the quantity.

The sandblasting of small engine parts in an enclosed container does not require a permit from the Air Section and the waste may be disposed of with the regular solid waste.

031. Asbestos Removal: Facilities involved in the renovation or demolition of marine vessels should be aware of the very stringent Federal and State regulations relating to the disturbance of asbestos containing materials. Prior to undertaking such work on a vessel which has asbestos containing materials contact Ewart Anderson or Peter Basil of the DERM Air Section at 372-6925 for information on the requirements. The regulations dealing with asbestos removal are primarily contained in 40 CFR 61, subpart M, and chapters 255 and 455, Florida Statutes. Significant penalties are mandated for violations of asbestos regulations.

032. Storm water runoff: (National Pollution Discharge Elimination System) the EPA "NPDES" program requires that each marine facility have a plan detailing how the facility deals with its rainwater runoff and the pollution carried by rainwater. Information on the NPDES program can be obtained from Mike Gambino, of the Stormwater Utility Program, at DERM by calling 372-6789.